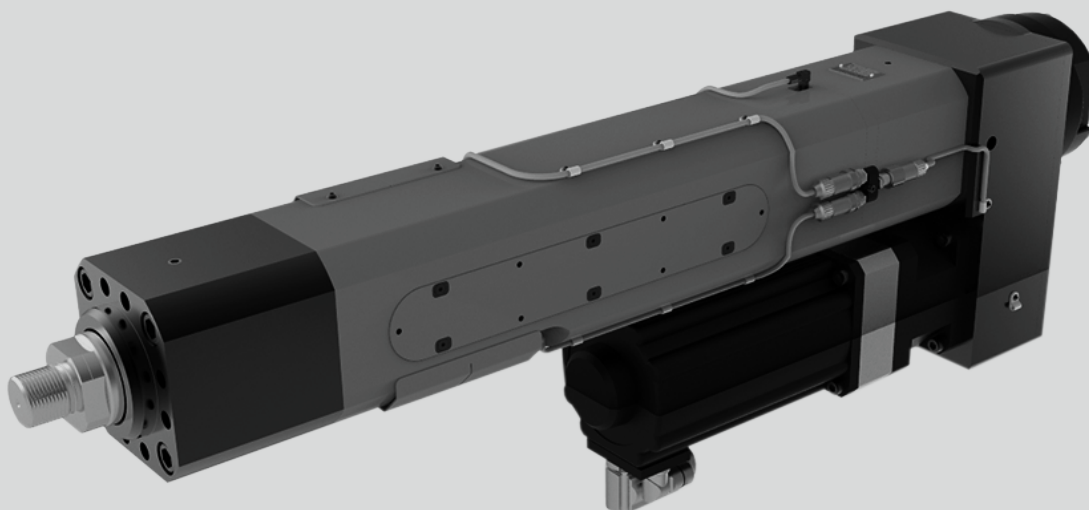


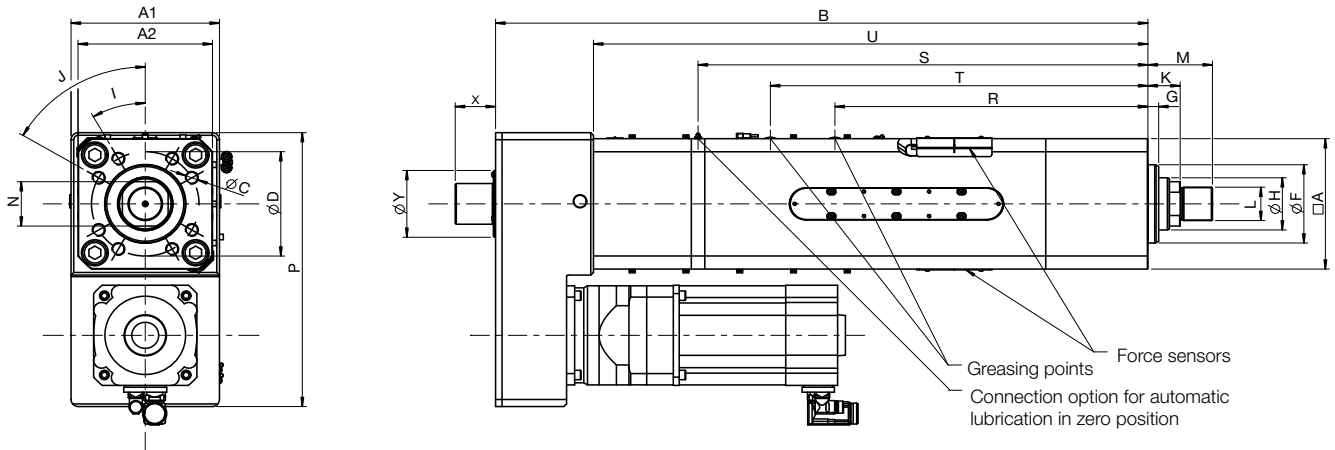
TOX®-ElectricDrive Type EPMK

Data sheet 40.20
2018/03



TOX[®]-Electric Power Module

Type EPMK 5 – 1000 kN



Dimensions and weights

Type	Stroke mm	Max. Nominal force kN	Weight approx. kg
EPMK 005.030.200	200	5	16
EPMK 010.030.250	250	10	22
EPMK 025.030.250	250	25	26
EPMK 055.030.300	300	55	46
EPMK 100.030.300	300	100	78
EPMK 200.030.300	300	200	154
EPMK 300.030.300	300	300	533
EPMK 400.030.300	300	400	543
EPMK 500.030.300	300	500	886
EPMK 700.030.300	300	700	1042
EPMK 1000.030.300	300	1000	1140

Type	A	A1	A2	B	C	D	F _T	G	H	I	J	K ⁽¹⁾	L	M ⁽¹⁾	N ⁽²⁾	P	R	S	T	U	V _{g6}	W	X	Y
EPMK 005.030.200	70	92	76	481	8xM8x16	60	50	13	25	15°	75°	25	M12x1.5	37	19	211	278.5	-	-	403	-	-	24	59
EPMK 010.030.250	70	92	76	657	8xM8x16	60	50	10	30	15°	75°	20	M12x1.5	32	24	211	300	-	390	568	-	-	24	59
EPMK 025.030.250	70	92	76	657	8xM8x16	60	50	10	30	15°	75°	28.5	M22x2	48.5	24	211	300	-	390	568	18	7	24	59
EPMK 055.030.300	95	120	105.5	761	8xM10x20	83	70	10	40	15°	75°	35	M30x2	60	34	245	316	-	456	678	26	7	28	60
EPMK 100.030.300	115	156	122	854	8xM12x25	98	75	15	50	15°	75°	36	M30x2	61	41	280	343	-	483	750	26	7	28	62
EPMK 200.030.300	145	170	146	973	8xM16x25	125	100	18	70	15°	75°	45.5	M39x2	81	60	327.5	385	-	525	838	-	-	52	94
EPMK 300.030.300	250	276	250	1218	8xM24x40	200	150	20	100	30°	60°	60	M64x2	120	85	525	582	836.5	702	1031	-	-	60	114
EPMK 400.030.300	250	276	250	1260	8xM24x40	200	150	20	100	30°	60°	60	M64x2	120	85	525	432	801.5	552	1074	-	-	60	114
EPMK 500.030.300	315	330	321	1435	8xM24x48	250	200	20	125	30°	60°	60	M64x2	120	100	610	537	946.5	657	1243	-	-	80	110
EPMK 700.030.300	315	330	321	1651	12xM24x48	250	200	20	150	30°	60°	60	M80x2	140	125	610	622	1066.5	742	1459	-	-	80	110
EPMK 1000.030.300	340	355	340	1693	12xM24x48	250	200	20	150	30°	60°	60	M80x2	140	125	695	622	1091.5	742	1456	-	-	80	110

Dimensions in mm

Specifications EPMK	005.030.200	010.030.250	025.030.250	055.030.300	100.030.300	200.030.300
Mechanical						
Rated force push	5 kN	10 kN	25 kN	55 kN	100 kN	200 kN
Rated force pull	3 kN	3 kN	7,5 kN	16,5 kN	30 kN	60 kN
Stroke ²⁾	200 mm	250 mm	250 mm	300 mm	300 mm	300 mm
Max. speed ²⁾	300 mm/s	300 mm/s	220 mm/s	200 mm/s	200 mm/s	120 mm/s
Max. short-term overload	10 % of rated force					
Distance repeatability ³⁾	< ± 0.01 mm					
Sensors						
Load cell ⁴⁾	0.25 – 5 kN	0.5 – 10 kN	1.25 – 25 kN	2.75 – 55 kN	5 – 100 kN	10 – 200 kN
Accuracy	< +/- 0.5 % of rated force. pressing					
Resolver	■	■	■	■	■	■
Resolution	0.0012 mm	0.0012 mm	0.0004 mm	0.0004 mm	0.0005 mm	0.0003 mm
Electrical						
Protection class	Drive IP54 (as component)					
Mains supply	see servo controller					
Climatic conditions	+ 10° to + 40° C, from 40° C performance loss, max. 55° C; air moisture < 75 %, without condensation					
Design	Ball screw with direct drive		Planetary threaded spindle with gear unit			

Specifications EPMK	300.030.300	400.030.300	500.030.300	700.030.300	1000.030.300
Mechanical					
Rated force push	300 kN	400 kN	500 kN	700 kN	1000 kN
Rated force pull	300 kN	400 kN	500 kN	700 kN	500 kN
Stroke ²⁾	300 mm	300 mm	300 mm	300 mm	300 mm
Max. speed ²⁾	90 mm/s	50 mm/s	50 mm/s	37.5 mm/s	50 mm/s
Max. short-term overload	10 % of rated force				
Distance repeatability ³⁾	< ± 0.01 mm				
Sensors					
Load cell ⁴⁾	15 – 300 kN	20 – 400 kN	25 – 500 kN	35 – 700 kN	50 – 1000 kN
Accuracy	< +/- 0.5 % of rated force, pressing				
Resolver	■	■	■	■	■
Resolution (theoretically)	0.0015 mm	0.0015 mm	0.0015 mm	0.0015 mm	0.0025 mm
Electrical					
Protection class	Drive IP54 (as component)				
Mains supply	see servo controller				
Climatic conditions	+ 10° to + 40° C, from 40° C performance loss, max. 55° C; air moisture < 75 %, without condensation				
Design	Planetary threaded spindle with gear unit				Motor with water cooling

¹⁾ Zero position of drive is the reference (marked) position + 3 mm

²⁾ Specials on request (colour, stroke, speed, ...)

³⁾ In thermal transient condition

⁴⁾ Recommended operating range 5 – 100 %